

Work Order ID 109015

Monday, November 04, 2013 11:12:22 AM

D3943-041

B109015

109015

Page 1

Item ID: D3943-041

Accept

N900040100

Setup Start *NS1*

Revision ID:

Stop *NS2*

Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013 Start Qty: 5.00

5

Cust Item ID:

Required Date: 11/15/2013 Req'd Qty: 5.00

5

Customer:

Reference:

Approvals: Process Plan: *mc*

Date: *13-11-04* Tooling:

Run Start *NR1*

QC:

Date: SPC (Y/N):

Date:

Stop *NR2*

Date:

Sequence ID/
Work Center ID

Operation
Description

Set Up/
Run Hours

Tool ID Tool # Plan
Code Accept Reject Reject Insp.
Qty Qty Number Stamp

Draw Nbr

Revision Nbr

D3943

E

100

0.00

100

Purchasing

Memo

0.00

Purchasing

Issue P/O: *21951*

Purchase Part Number: 8143919

Supplier: Princess Auto

Certificate of conformity is required

Description: 4000 lbs lever chain hoist

CL 13/11/04 5

110

Receive & Inspect for Damage & Mat'l Certs

0.00

110

Packaging

Memo

0.00

Packaging

Ensure material certification is attached

P 13/11/06 (5)

Work Order ID 109015

109015

Page 2

Monday, November 04, 2013 11:12:22 AM

Item ID: D3943-041

Accept

N900040100

Setup Start *NS1*

Revision ID:

Item Name: Ground Handlling Crank Assembly

Stop *NS2*

Start Date: 11/4/2013 Start Qty: 5.00 *5*

Cust Item ID:

Required Date: 11/15/2013 Req'd Qty: 5.00 *5*

Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start *NR1*

QC:

Date:

SPC (Y/N):

Date:

Stop *NR2*

Sequence ID/
Work Center ID

Operation
Description

Set Up/
Run Hours

Tool ID

Tool #

Plan
Code

Accept
Qty

Reject
Qty

Reject
Number

Insp.
Stamp

120

QC6- Inspect dimensions to drawing

0.00

DAS

120

27

QC

Memo

0.00

9-89

Quality Control

13/11/6

S

130

0.00

130

Large Fab

Large Fab

Memo

0.00

1-Disassemble chain host as per dwg

2-Drill handle ass'y (D3943-051) as per dwg

Q 13-11-21

Punch

outside service.

#2 ImI machine gun sandblast

Pro: 22014

CX 13/11/21 (5)

recd. #3 Receive and inspect

13/11/14 (5)

acs

Shp
13/11/27

S

Work Order ID 109015***109015***

Page 3

Monday, November 04, 2013 11:12:22 AM

Item ID: D3943-041

Accept

N900040100

Setup Start

NS1

Revision ID:

Stop

NS2

Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013 Start Qty: 5.00

5

Cust Item ID:

Required Date: 11/15/2013 Req'd Qty: 5.00

5

Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start

NR1

QC:

Date:

SPC (Y/N):

Date:

Stop

NR2Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

131

0.00

131

Large Fab

Memo

0.00

Large Fab

Using tool DT9854 compress flange on brake/clutch cover so that there is minimal "slop" in the chain hoist handle.

S EL 13-11-21

140

QC5- Inspect part completeness to step on W/O

0.00

140

QC

Memo

0.00

Quality Control

DAS
27
9-89

B 11.22

S

180

Pick Kit

0.00

180

Packaging

Memo

0.00

Packaging

S EL 13-11-21

Work Order ID 109015***109015***

Page 4

Item ID: D3943-041

Accept

N900040100Setup Start ***NS1***

Revision ID:

Stop ***NS2***

Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013 Start Qty: 5.00

5

Cust Item ID:

Required Date: 11/15/2013 Req'd Qty: 5.00

5

Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start ***NR1***

QC:

Date:

SPC (Y/N):

Date:

Stop ***NR2***Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

190

0.00

190

Large Fab

Large Fab

Memo

0.00

1-Assemble as per dwg
(assy landyard CBL-1240 to CBL-460)
2- touch up with paint if necessary

Remove brake/clutch cover (under handle) and apply LPS 3 to entire mechanism
and brake/clutch cover so that a seal will be created when the cover is reinstalled
Reinstall brake/clutch cover and top gear
Apply LPS 3 to all surfaces that will be covered when the handle is reinstalled

191

0.00

191

Large Fab

Large Fab

Memo

0.00

Remove gear assembly cover (underside of chain hoist) and add enough general
duty grease to cover entire gear assembly.
Apply LPS 3 to entire gear assembly and gear assembly cover so that a seal will
be created when the cover is reinstalled
Reinstall gear assembly cover

SX

S

Q

13-11-21

B 13/11/11

SX

Q

13-11-21

Work Order ID 109015

109015

Page 5

Monday, November 04, 2013 11:12:22 AM

Item ID: D3943-041

Accept

N900040100

Setup Start

NS1

Revision ID:

Stop

NS2

Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013 Start Qty: 5.00

5

Cust Item ID:

Required Date: 11/15/2013 Req'd Qty: 5.00

5

Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start

NR1

QC:

Date:

SPC (Y/N):

Date:

Stop

NR2

Sequence ID/
Work Center ID

Operation
Description

Set Up/
Run Hours

Tool ID Tool # Plan Accept Reject Reject Insp.
Code Qty Qty Number Stamp

200

QC5- Inspect part completeness to step on W/O

0.00

200

QC

Memo

0.00

DAS

16

9-89

13/11/27

Quality Control

1-Calibrate and tag as per dwg and QSI 008 4.4
Calibration Cert. filled out

210

Identify as per dwg & Stock Location:

0.00

210

Packaging

Memo

0.00

2x PPP 108468
3x PPP 108075

Packaging

220

QC21- Final Inspection - Work Order Release

0.00

220

QC

Memo

0.00

Quality Control

CALIBRATION
ID D3943-041 B109015
BY 8
DATE 13/11/27
DUE 1 YCAN 13/11/28

5x DAS 13-11-28
28
9-89

13/11/29

13-11-28

Picklist Print

Montlay, November 04, 2013 11:12:19 AM

Page 1

Work Order ID: 109015
Parent Item: D3943-041
Parent Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013 Required Date: 11/15/2013
Start Qty: 5.00 Required Qty: 5.00

Comments: IPP Rev:A New Issue 09-06-02 EC Verified By: JLM IPP RevB: add DEO DD 09.11.18
verified by:JLM IPP Rev:C as per dwg REV.C DD 10.02.22 verified by:EC IPP
REV:D 11.08.16 AS PER REV.E DD VERF:JLM

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
D4405-1 Eye And Fork Swivel		Manufactured	No			180	Each	10.0000	1	5		13-11-21	
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				st376		10							
				70986		5							
				91963		5							
8143919 Lever Chain Hoist		Purchased	No			110	Each	0.0000	1	5		13-11-21	
D3943-051 Handle Assembly		Manufactured	No			180	Each	0.0000	1	5		13-11-18	
D3943-053 Chain Assembly		Manufactured	No			180	Each	0.0000	1	5		13-11-21	
D3943-3 Handle Extension		Manufactured	No			180	Each	15.0000	1	5		13-11-14	
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				WA001		15							
				101564		10							
				97082		5							
CBL-1240 Cable		Purchased	No			180	f	668.2815	1	5		13/11/11	DAS 36 9-89
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				GA		668.2814893							
				113565		3.911789							
				119690		381.00006							
				122190		3.9035844							
				123283		279.466056							

Picklist Print

Monday, November 04, 2013 11:12:20 AM

Page 2

Work Order ID: 109015

Parent Item: D3943-041

Parent Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013

Required Date: 11/15/2013

Start Qty: 5.00

Required Qty: 5.00

CBL-460 Purchased No

Loop Sleeve

180 Each 283.0000 2 10 13/11/11 DAS 36 9-89

Location	Loc Qty	Loc Code
GA	283	
123283	1	
124272	5	
124336	54	
125499	223	

D3585-1 Manufactured No

Set Screw

180 Each 40.0000 1 5 13-11-21

Location	Loc Qty	Loc Code
GA	40	
35705	40	

D3949-041 Manufactured No

Remove Before Flight Flag Assembly

180 Each 10.0000 1 5 13/11/11 DAS 36 9-89

Location	Loc Qty	Loc Code
ST494	10	
102434	6	
97116	4	

D3954-7 Manufactured No

Ratchet Lug

180 Each 11.0000 1 5 13-11-7

Location	Loc Qty	Loc Code
ST077	3	
97242	3	
WA001	8	
101753	8	

Monday, November 04, 2013 11:12:20 AM

Shop Packet Print

Page 2

Picklist Print

Monday, November 04, 2013 11:12:20 AM

Page 3

Work Order ID: 109015

Parent Item: D3943-041

Parent Item Name: Ground Handlling Crank Assembly

Start Date: 11/4/2013

Required Date: 11/15/2013

Start Qty: 5.00

Required Qty: 5.00

AN5-11A Purchased No

180 Each 551.0000

1 5

BOLT

EL 13-11-14

Location

Loc Qty

Loc Code

ST514

92

125388

92

ST517

459

123533

259

M126105

200

5

NAS1149F0563P

Purchased No

180 Each 546.0000

1 5

Washer

EL 13-11-14

Location

Loc Qty

Loc Code

ST295

546

121350

546

5

MS21042L5

Purchased No

180 Each 1,216.0000

1 5

Nut

EL 13-11-14

Location

Loc Qty

Loc Code

st507

716

125535

716

5

ST509

500

m127304

500

S1475

Purchased No

180 Each 6.0000

1 5

Spring

EL 13-11-20

Location

Loc Qty

Loc Code

ST392

6

117812

2

123641

4

m127515 x 5

3408A59

Purchased No

180 Each 19.0000

1 5

BALL PLUNGER

EL 13-11-14

Location

Loc Qty

Loc Code

ST397

19

125637

19

5

Monday, November 04, 2013 11:12:21 AM

Shop Packet Print

Page 3

Picklist Print

Monday, November 04, 2013 11:12:21 AM

Page 4

Work Order ID: 109015

Parent Item: D3943-041

Parent Item Name: Ground Handling Crank Assembly

Start Date: 11/4/2013

Required Date: 11/15/2013

Start Qty: 5.00

Required Qty: 5.00

HX-15 Purchased No
1/4-20 UNCx3/4 S.H.C.S.

180 Each 45.0000

1

5

Q 13-11-14

Location

Loc Qty

Loc Code

ST285

45

114383

17

117865

28

HX-16 Purchased No

180 Each 155.0000

3

15

Q 13-11-14

Location

Loc Qty

Loc Code

ST285

155

113771

50

117346

85

117865

20

5

Monday, November 04, 2013 11:12:21 AM

Shop Packet Print

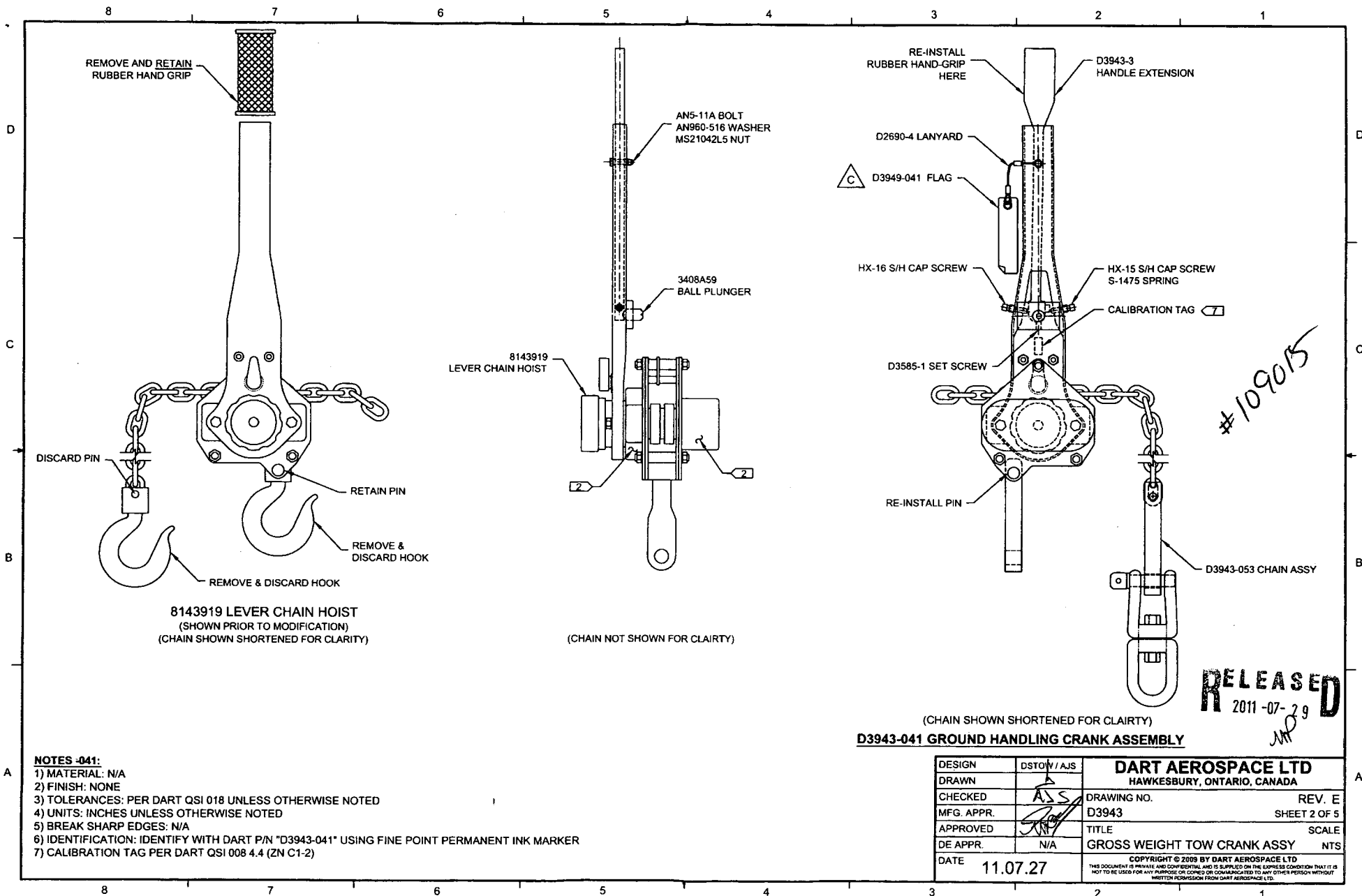
Page 4

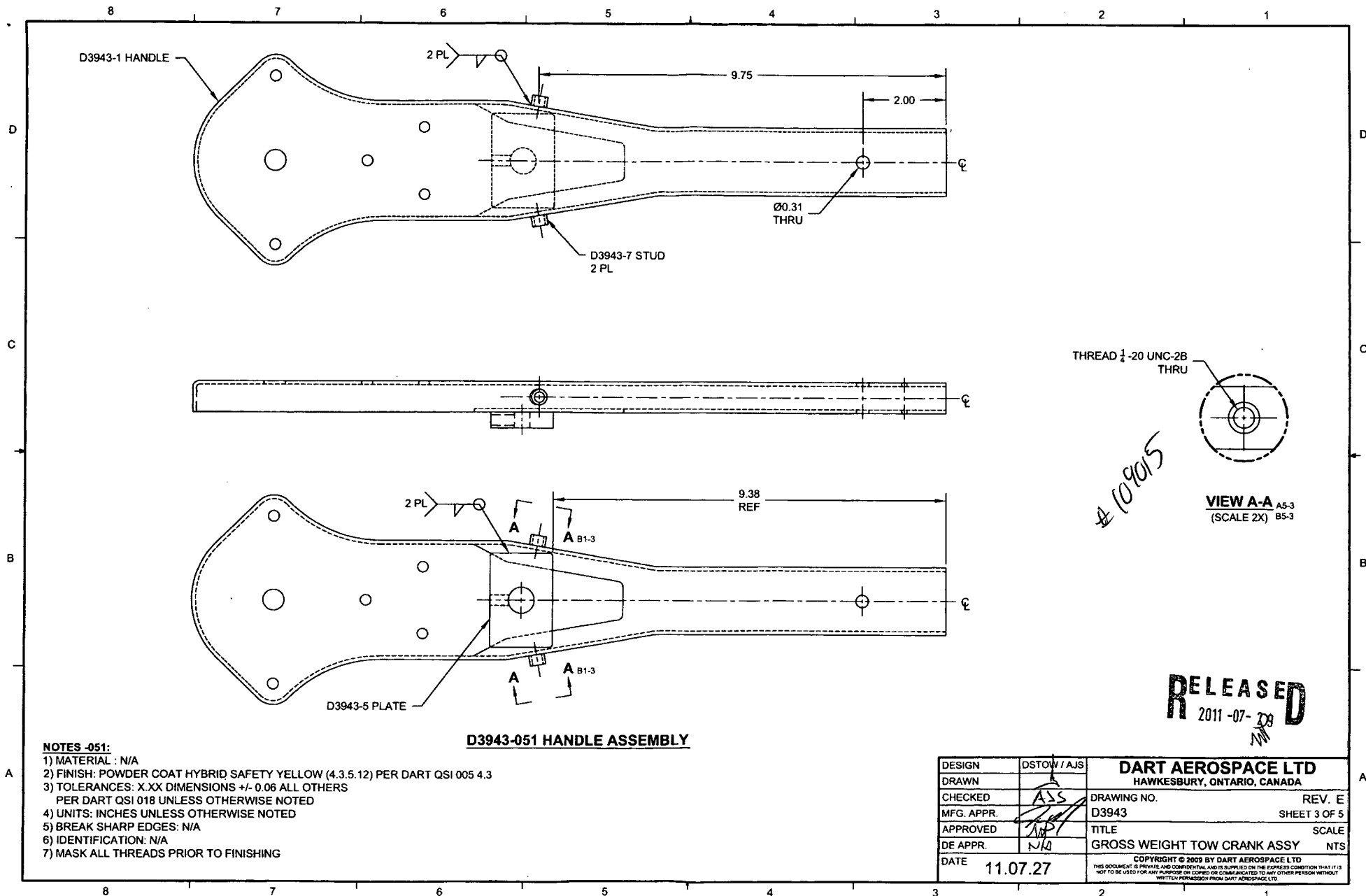
ITEM No.	QTY -041	QTY -051	QTY -053	PART NUMBER	DESCRIPTION	PREFERRED SUPPLIER
1	X			D3943-041	GROUND HANDLING CRANK ASSEMBLY	
5	1	X		D3943-051	HANDLE ASSEMBLY	
6	1		X	D3943-053	CHAIN ASSEMBLY	
11		1		D3943-1	HANDLE	M/F HANDLE FROM DIS-ASSEMBLED ITEM 39
12	1			D3943-3	HANDLE EXTENSION	
13		1		D3943-5	PLATE	
14		2		D3943-7	STUD	
15			1	D3943-9	CHAIN	USE CHAIN SUPPLIED WITH ITEM 39
16			1	D4405-1	EYE AND FORK SWIVEL	
21	1			D2690-4	LANYARD	
22	1			D3585-1	SET SCREW	
23	1			D3949-041	REMOVE BEFORE FLIGHT FLAG	
24			1	D3954-5	CHAIN LUG	
25	1			D3954-7	RATCHET LUG	
26			1	D3954-9	GWT CHAIN PIN	
31	1			AN5-11A	BOLT	
32	1			AN960-516	WASHER	
33	1			MS21042L5	NUT	
39	1			8143919	LEVER CHAIN HOIST (POWER FIST)	PRINCESS AUTO / 4000 lbs CAPACITY
51	1			S-1475	SPRING	REID SUPPLY
52	1			3408A59	BALL PLUNGER	McMASTER CARR
53	1			HX-15	SOCKET HEAD CAP SCREW 1/2-20 UNC X 0.75 LG	HASKINS
54	1			HX-16	SOCKET HEAD CAP SCREW 1/2-20 UNC X 1.0 LG	HASKINS

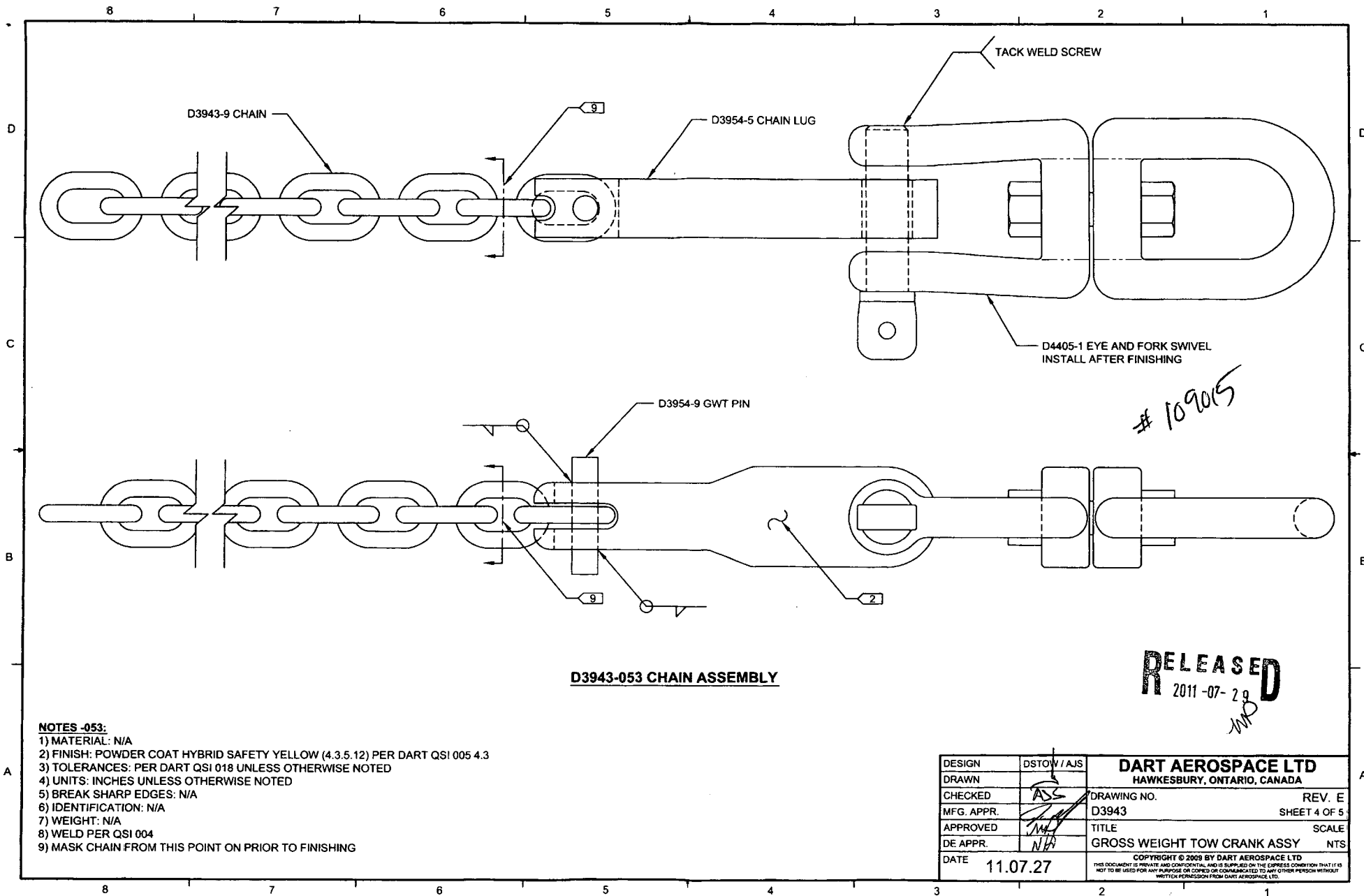
MK
13-11-04
109015

RELEASED
2011-07-29
MD

E	CHANGED D3945-3 MAT'L TO SS (B8-5); FINISH NOW "NONE" (A7-5); TAP DRILL FOR 1/4-20 UNF-2B WAS PILOT HOLE NOTE (B1-5). PER PAR11-113.	MB	11.07.27
D	SHT 1 PL, ITEMS 51-54 RENUMBERED SEE PREV. REV. FOR DETAILS, ITEM 16 ADDED (VIEWS UPDATED). SHT 2 ZN D3 FLAG RELOCATED. SHT 3 ZONE D3, Ø0.12 HOLE DELETED. (SEE NCR 11-495)	AJS	11.05.16
C	RMV FINISH -041 (ZN A8-2). ADD NEW FINISH -051/-053/-1/-3 (A8-3/-4/-5). ADD CALIBRATION (A8-2), (1) HX-16 WAS HX-15 (B3-1, C3-1), PAR 10-001	CP	10.01.26
B	SHT 1 PL, ITEM 31 WAS AN4-10A, ITEM 32 WAS AN960-416, ITEM 33 WAS MS21042-4, ITEM 43 WAS 0.75 LG. SHEETS 2 - 5 NOTES: FINISH FOR ALL COMPONENTS NOW YELLOW SPRAY PAINT.	AJS	09.10.15
A	NEW ISSUE	AJS	09.05.13
REV.	DESCRIPTION	BY	DATE
DESIGN	DSTON / AJS		
DRAWN			
CHECKED	ASS		
MFG. APPR.			
APPROVED			
DE APPR.	N/A		
DATE	11.07.27		
DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA DRAWING NO. D3943 REV. E SHEET 1 OF 5 TITLE GROSS WEIGHT TOW CRANK ASSY SCALE NTS COPYRIGHT © 2009 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSES OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.			





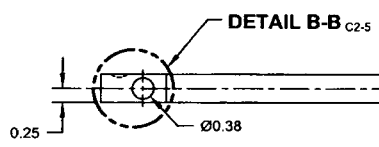
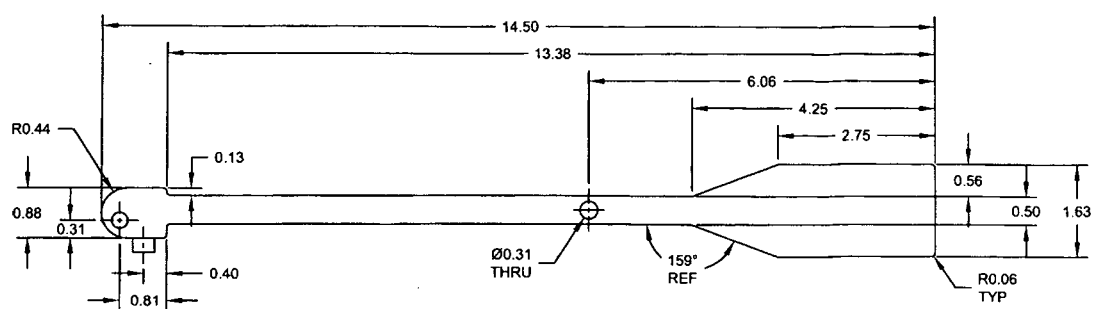


NOTES -053:

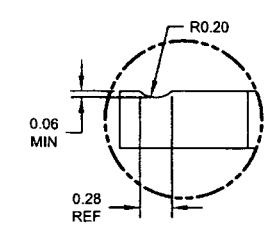
- 1) MATERIAL: N/A
- 2) FINISH: POWDER COAT HYBRID SAFETY YELLOW (4.3.5.12) PER DART QSI 005 4.3
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: N/A
- 6) IDENTIFICATION: N/A
- 7) WEIGHT: N/A
- 8) WELD PER QSI 004
- 9) MASK CHAIN FROM THIS POINT ON PRIOR TO FINISHING

DESIGN	DSTOW / AJS	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	ASS	DRAWING NO.	REV. E
CHECKED		D3943	SHEET 4 OF 5
MFG. APPR.		TITLE	SCALE
APPROVED		GROSS WEIGHT TOW CRANK ASSY	NTS
DE APPR.		COPYRIGHT © 2009 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.	
DATE	11.07.27		

8 7 6 5 4 3 2 1



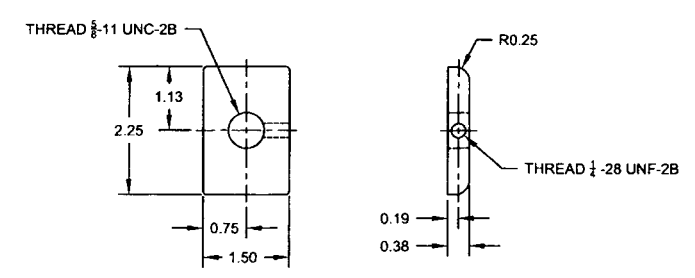
D3943-3 HANDLE EXTENSION



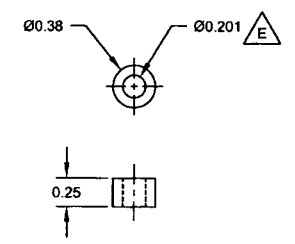
DETAIL B-B C7-5
(DIMPLE DETAIL)
(SCALE 2X)

#109015

- NOTES:**
- 1) MATERIAL -3: AISI 304/316 STAINLESS STEEL SHEET ANNEALED 2B FINISH PER MIL-S-5059 OR AMS 5513 (304) OR AMS 5524 (316) OR ASTM A240 OR ASME SA240 REF DART SPEC M304S OR:
AISI 303 STAINLESS STEEL SHEET ANNEALED 2B FINISH PER MIL-S-5059 OR ASTM A240 OR ASME SA240 REF DART SPEC M303S
 - 5: MILD STEEL, SHEET AISI 1010-1025 OR ASTM A36/A366/A1008 OR CSA G40-21, 38W/44W/50W/60W/70W REF DART SPEC M1010-S OR:
MILD STEEL, BAR AISI 1010-1025 OR ASTM A36/A366/A569/A570 OR CSA G40-21, 38W/44W/50W/60W/70W REF DART SPEC M1010-B
 - 7: MILD STEEL, ROUND BAR AISI 1018-1025 PER MIL-S-7097 REF DART SPEC M1018-R
 - 2) FINISH: NONE
 - 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
 - 4) UNITS: INCHES UNLESS OTHERWISE NOTED
 - 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
 - 6) IDENTIFICATION: N/A



D3943-5 PLATE



D3943-7 STUD
(SCALE 2X)

RELEASED
2011-07-28

DESIGN	DSTOW / AJS	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN		DRAWING NO.	REV. E
CHECKED		D3943	SHEET 5 OF 5
MFG. APPR.		TITLE	SCALE
APPROVED		GROSS WEIGHT TOW CRANK ASSY	NTS
DE APPR.		COPYRIGHT © 2009 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.	
DATE	11.07.27		

8 7 6 5 4 3 2 1



Dart Aerospace Ltd.
1270 Aberdeen Street
Hawkesbury, ON K6A 1K7
Tel: 613 632 9577
Fax: 613 632 1053

PURCHASE ORDER

Purchase Order ID PO21951

Purchase Order Date 11/4/2013

PO Print Date 11/4/2013

Page Number 1 of 1

Order From :

VC-PRI001

PRINCESS AUTO LTD.
P.O. BOX 1005
WINNIPEG, MB R3C 2W7
CA

Ship To : DART AEROSPACE LTD
1270 ABERDEEN
HAWKESBURY, ON K6A 1K7
CANADA

FAKED
11/3/11/04

Contact Name		Buyer	Chantal Lavoie
Vendor Phone	613 247 1651	Customer POID	
		Customer Tax #	10127-2607
Ship To Contact		Terms	Net 30
Ship To Phone		Currency	CAD
Ship Via:	Purolator ground collect	FOB	Destination-Collect
Ship Acct:			

Line Nbr	Reference Vendor Part Number Line Comments Delivery Comments	Description/ Mfg ID	Req Date/ Taxable Promise Date	CD	Req Qty/ Unit of Measure	PO Unit Price	Extended Price
1	8143919	Lever Chain Hoist	11/11/2013 Yes 11/11/2013		5.00 Each	\$159.99	\$799.95

AS PER DWG D3943 REV. E
B109015

****PLEASE ADVISE DELIVERY****

Line Total: \$799.95

PO Total: \$799.95

u *Q/M*

Note: Pricing listed above is as per contract agreement between Dart Aerospace and the respective manufacturer.
No substitution or deviation without consent.
Certificate of Conformity or Material Certification required ☒ YES ☐ NO
PST# 6122-5207

Change Nbr: 1

Change Date: 11/4/2013

PARCEL PACKING LIST

Page

1

From
E-FULFILLMENT CENTRE
8620 ESCARPMENT WAY
MILTON ONTARIO
L9T 0M1

To
. Dart Aerospace Ltd
1270 Aberdeen St

Hawkesbury ON
K6A 1K7 CAN
613-632-9577

Order Number 001387960010000
Parcel Weight 151.200

Parcel Number 03080854
PP#: 115892

ASCENT Parcel #

BOSS Parcel #



PUROLATOR

Container: EFC

Item	Description	Qty Shipped
8143919	HOIST CHAIN 2 TON LEVER	5

***** THIS IS NOT AN INVOICE *****

* Thank you for your order - shipping status is available at princessauto.com *

* Questions? Comments? 1-800-665-8685 *

* Merci d'avoir passé votre commande chez Princess Auto! *

* Contactez-nous: 1-800-665-8685 *

* Vous pouvez utiliser votre numéro de commande ou les 4 derniers *

* chiffres de votre numéro de téléphone pour faire un suivit de votre colis. *

INTERNAL CALIBRATION CERTIFICATE

Instrument #	Description	Serial #
D3943-041	Ground Handling Crank Assembly	B109015

Calibrated by	Date of calibration	Calibrated with	Due	Certificate #
ED	Nov. 27th, 2013			

New tool	Disposed	In Repair	On Hold	Being Calibrated

Employee	Department	Comments:
N/A	N/A	MUST BE CALIBRATED WITH IN 1 YEAR OF PURCHASE OR FIRST OPERATION

Spec.	Tolerance is + /-	Result	Pass Fail
3500LBS	3500-3700LBS	3600LBS	PASS

Entered By:

Eric Downing